

1993) is suitable for mango cultivation. In addition to these two species *Mangifera sylvatica* is also recorded in these islands. The mango has been introduced in these islands when settlers were brought from different corners of India and also during the period when the Japanese ruled these islands and making these islands a rich source of mango genetic material.

In the tropics the flower induction takes place during dry period. If this lasts long enough, about four months then flowers will appear in the same dry season. Otherwise bloom will be during the rains which could prevent pollination and fruit setting. Generally mango tree flowers in December-January and fruiting takes place in April-July but there are some varieties which produce flowers twice a year e.g. Neelum and some are irregular bearers e.g. Malgoa. But while surveying in 1992-93 to select some promising clones which produces physiologically mature fruits before the onset of the

monsoons, it was noticed and recorded that some mango trees in South Andaman-flower and fruit throughout year and there are some quite old trees which have not flowered yet. This flowering and fruiting throughout year varies from low to moderate. The physiological and biochemical details are required to be studied for this nature of flowering. This typical flowering behaviour of mango in Andamans can be due to uneven distribution of floreigen and other assimillates. Due to typical tropical climate of these islands the minimum and maximum temperature range is very narrow which can also be a cause of erratic flowering but whatever the cause may be, this typical flowering in mango can be utilized for an improvement programme.

January 19, 1996

D.B. SINGH

T.V.R.S. SHARMA

Central Agricultural Research Institute,
Port Blair, Andaman & Nicobar Islands.

REFERENCES

KOSTERMANS, A.J.G.H. & J.M. BOMPARD (1993): The mangoes their nomenclature, horticulture and utilization. London.

PARKINSON, C.E. (1972): A forest flora of the Andaman Islands. pp 139.

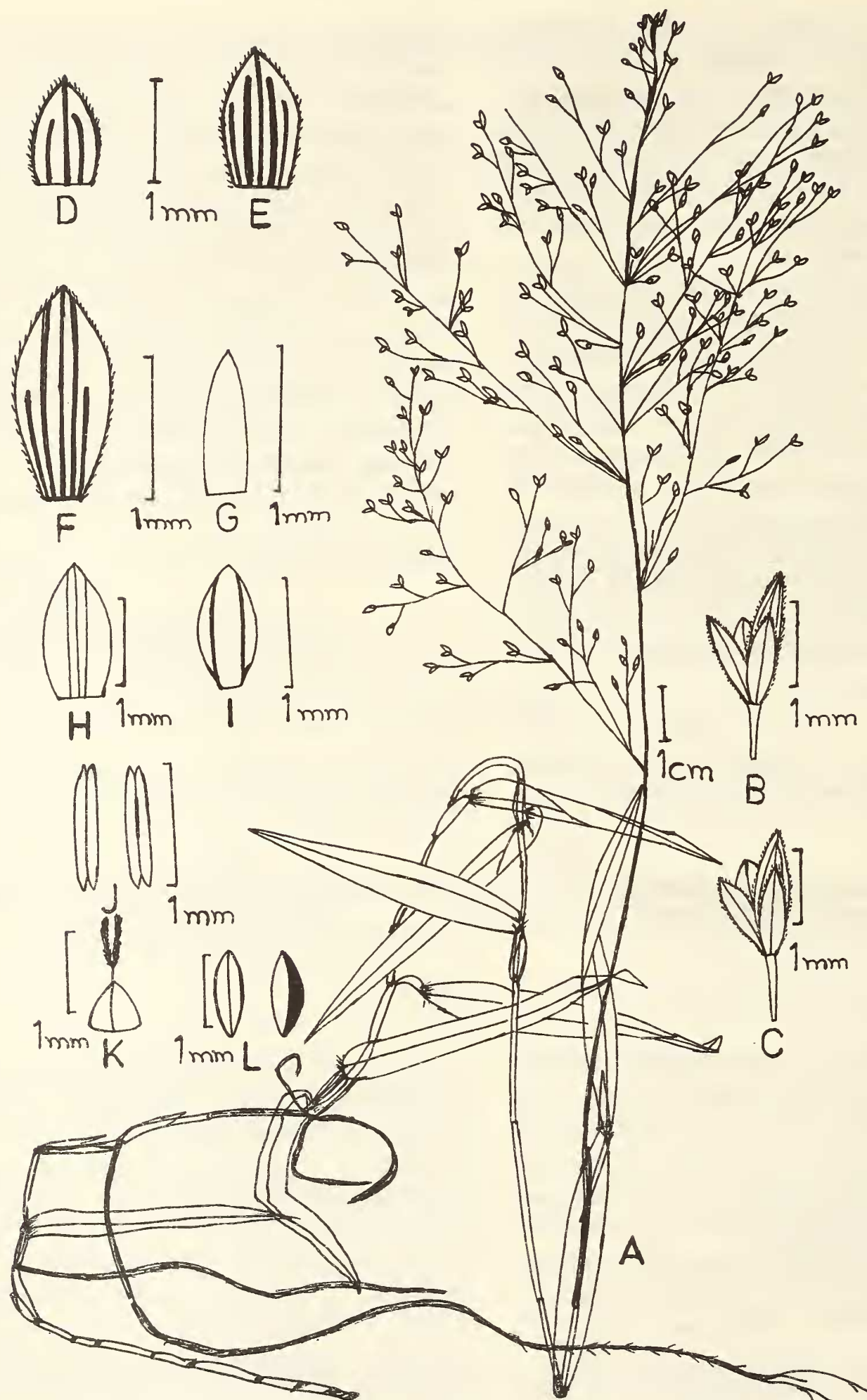
34. REDISCOVERY AT A NEW LOCATION OF A RARE GRASS, *CYRTOCOCCUM SPARSICOMUM* (NEES EX STEUD.) A. CAMUS, IN TAMIL NADU

(With one text-figure)

The specimens of a grass species, collected under shade in the dry mixed deciduous forest of the Alagarkovil MCPA of Dindigul Anna District in Tamil Nadu, were sent for identification to the Director, Royal Botanic Gardens, Kew, England, and identified by the grass expert, T.A. Cope, as *Panicum sparsicomum* Nees ex Steud. The present record is a rediscovery at a different location after its discovery from Kodaikanal Ghats in Tamil Nadu. There is no specimen in MH.

Hook.f. (1896), Alston (1931), Bor (1960), Nair (1989) and Davidse (1994) followed the treatment of *Panicum sparsicomum* Nees ex Steud.

Bor (*l.c.*) opines that the species seems to occupy an intermediary position between *Panicum* and *Cyrtococcum* and they retained it in *Panicum*. Davidse (*l.c.*) corroborates the same and further says that the spikelets lack the typical crest characteristic for *Cyrtococcum*. On the other hand, Fischer (1934, 1957) and Senaratna (1956) followed A. Camus treatment, i.e. *Cyrtococcum sparsicomum* (Nees ex Steud.) A. Camus, who effected combination based on slightly compressed and somewhat gibbous nature of the spikelets. T.A. Cope (*in litt.*) states that "J.F. Veldkamp, author of GRASSES FOR FLORA MALESIANA considers it as a true *Cyrtococcum*." Even though



Figs. A-L. *Cyrtococcum sparsicomum* (Nees ex Steud.) A. Camus - A. Habit; B. Spikelet flowering; C. Spikelet fruiting; D. Lower glume; E. Upper glume; F. First lemma; G. Palea; H. Second lemma; I. Palea; J. Anthers: dorsal and ventral views; K. Ovary; and L. Caryopsis

the species occupies an intermediary position between these two genera, the author accepts J.F. Veldkamp's opinion because similarities are more to *Cyrtococcum* rather than *Panicum*.

***Cyrtococcum sparsicomum* (Nees ex Steud.)**

A Camus in *Bull. Mus. Hist. Nat.* (Paris) 27:118.1921; Fisher in Gamble, *Fl. Pres. Madras* 1786. 1934&3: 1237. 1957 (repr. ed.); Senaratna, *Grass. Ceylon* 121:1956. *Panicum sparsicomum* Nees ex Steud., *Syn. Pl. Glumac.* 1:83.1854; Hook.f., *Fl. Brit. India* 7:58.1896; Alston in Trimen, *Handb. Fl. Ceylon* 6 (Suppl.): 321.1931; Bor, *Grass. Burma Ceylon India Pakistan* 330. 1960; Nair in Henry, Chithra and Balakrishnan, *Fl. Tamil Nadu Series 1: Analysis* 3:131.1989; Davidse in Dassanayake, *Rev. Handb. Fl. Ceylon* 7:344.1994.

Specimens examined: Tamil Nadu: Dindigul Anna District, Alagarkovil MPCA, Alagarmalai R.F.: \pm 475 m, 7.iii.1994, M.B. Viswanathan 3075;

\pm 215, 3.ii.1995. M.B. Viswanathan 17016; \pm 450 m, 4.ii.1995, M.B. Viswanathan 17027.

ACKNOWLEDGEMENTS

I am grateful to the Director and Dr. T.A. Cope of the Royal Botanic Gardens, Kew, England, for identification. I am thankful to Mr. Vinay Tandon, Foundation for Revitalization of Local Health Traditions (FRLHT) Bangalore, for financial assistance for the Project and to Dr. N. Sukumaran, Professor and Head of our Centre, for continuous help and encouragement.

June 17, 1996

M.B. VISWANATHAN
Sri Paramakalyani Centre for
Environmental Sciences,
Manonmaniam Sundaranar University,
Alwarkurichi-627 412.

35. *SCURRULA PARASITICA* LINN. PARASITIC ON *CALLIANDRA* SPP. AND ITS MANAGEMENT

Scurrula parasitica is an epiparasite on a variety of economically important trees including ornamental trees of high aesthetic value. It spreads on branches affecting bio-mass production of its host (William 1980).

The genus *Calliandra* (Leguminosae: Mimosae) also called Trinidad Flame Tree is represented by a group of ornamental flowering trees with handsome, bipinnate feathery leaves and powder-puff like flowers. *Calliandra guildingi* (*tweedii*) is a free flowering hardy tree blooming round the year. The flowers (anthers) are reddish-purple. White flowered *Calliandra speciosa* is also in cultivation.

In 1994, it was observed that *C. guildingi* planted on either side of the front of the old Agricultural College, Hebbal, Bangalore which had grown beyond their usual size, the tertiary branches stretching laterally, were invaded by the flowering parasite *S. parasitica*. Another species *C. speciosa* grown near the entrance of the floriculture section

at GKVK Campus of the University of Agricultural Sciences, Bangalore, was also found parasitized by the same species.

As characteristic of any true parasite. *S. parasitica* also does not kill the host immediately. Only the branches of *C. guildingi* heavily infested by *S. parasitica* succumbed ultimately, which effectively is in partial agreement with the observation made by Bidie in Fischer 1926, who wrote that the exotic plants invaded by the parasites of Loranthii are killed. In the case only two of the four branches infested by the parasite were killed, which may be due to allelopathic effect, at a later stage. The parasitized branches beyond the point of cortical root development were thin with sparse flowers and presented a very sickly and dried appearance at the tip, thus affecting both growth as well as its aesthetic value, while the parasite putting forth a luxuriant growth looked like a leafy cascade. The parasite spread on all the branches and established itself very well, at the cost of the host.